

REMARKS

At the outset, the courtesies extended by the Examiner in granting to 8 March 2005 interview, and the professionalism he demonstrated during the interview, are appreciatively noted. During the interview, the references cited by the Examiner were discussed in light of clarifying amendments proposed to the claims by the undersigned attorney, as set forth herein.

Responsive to the 23 November 2004 Office Action, Claims 1, 3, 7, 9, 13, and 15 are hereby amended as proposed at the interview for further prosecution with the other pending claims. It is believed that with such amendment of claims, there is a further clarification of their recitations for this Patent Application.

In the Office Action, the Examiner rejected Claims 1 – 18 under 35 U.S.C. § 103(a) as being unpatentable over the Adams, Jr. et al. reference in view of the Abramson et al. reference, further in view of the Sheehy reference. In setting forth this rejection, the Examiner acknowledged that while Adams, Jr. et al. discloses the use of system memory for storing a key corresponding to a source address, it fails to disclose the additional use of any cache memory. The Examiner, however, cited Abramson et al. for disclosing the use of cache memory for holding frequently requested data and concluded that it would have been obvious to have modified the Adams, Jr. et al. system to incorporate such cache memory use, in order to provide fast local storage memory.

The Examiner further acknowledged that Adams, Jr. et al. fails to explicitly teach the authorization of an acknowledgment signal for an external source, but again cited Abramson et al. in that regard. The Examiner reasoned in this regard that as Abramson et al. permits the retrieval of data for other memory operations even in the event of a cache miss, it would have been obvious to modify the Adams, Jr. et al. system for similarly allowing other memory operations by an external source where a memory miss has occurred.

The Examiner further acknowledged that Adams, Jr. et al. fails to explicitly teach the determination of whether a source address is included in a cache. The Examiner cited Sheehy for this feature, though, concluding that it would have been obvious to have modified the Adams, Jr. et al. system to store a particular cache entry where such determination indicates a corresponding source address to be missing.

As each of the newly-amended independent Claims 1, 7, and 13 now more clearly recites, Applicant's claimed approach is one which facilitates the fast and efficient handling of encrypted information received during "acknowledgment-responsive wireless communication" established with an "external source." The approach employs a key cache which, at the start of such communication with the given external source, may or may not contain the key required for decryption of information from that external source. If not initially found in the cache when the first packet is received, and while the external source is preparing to re-send such

packet, the key is promptly retrieved from system memory and included “as a new entry in the cache to prepare the cache for decrypting a packet subsequently resent by the external source,” as each of the newly-amended independent Claims 1, 7, and 13 also now more clearly recites.

In certain embodiments, an acknowledgment signal is authorized “for anticipatory transmission to the external source of the packet prior to retrieval” of the corresponding key, as newly-amended Claims 3, 9, and 15 now more clearly recite. The retrieved key is then used in those embodiments to decrypt the necessary part of the received packet “prior to arrival of a subsequent packet from the external source,” as Claims 3, 9, and 15 also more clearly recite.

The full combination of features now more clearly recited by each of the pending independent claims 1, 7, and 13, or by the remaining claims depending therefrom, is nowhere disclosed by the cited references. As the Examiner properly noted, the Adams, Jr., et al. reference fails to disclose the use of any key cache, much less one that is used in the manner claimed by Applicants. The secondarily-cited Abramson et al. reference does disclose the use of cache memory, and prescribes certain management steps to be taken upon the occurrence of a cache miss; however, those steps are both in purpose and actual function quite different from Applicant’s claimed approach.

The thrust of Abramson et al. is to preserve the given cache memory’s accessibility to other load operations while continuing to further service the

particular load operation initially resulting in the cache miss. Although Abramson et al. does speak in terms of looking to “an external source” in further processing a cache miss, such “external source” refers to a further source of storage in which to seek the missing data, “such as a level 2 (L2) or higher order of cache memory or the external main memory residing on the system bus,” (column 24; lines 4-6). Such external source in Abramson et al. simply does not refer to any “external source” that prompted the attempted retrieval of data from the cache in the first place, let alone one with which “acknowledgment-responsive wireless communication” has been established. Moreover, Abramson et al. nowhere even suggests the prompt and timely retrieval and entry in the cache of any key in order “to prepare the cache for decrypting a packet subsequently re-sent by the external source,” as Claims 1, 7, and 13 also now more clearly recite. To the contrary, Abramson et al. specifically provides for queuing the given load operation request as an entry in a queue 603, to wait until while the cache miss is further processed to satisfaction.

Given the deficient teachings of the primarily cited Adams, Jr. et al. and Abramson et al. references, the Sheehy reference is found to be ineffectual to the present patentability analysis. It was simply cited by the Examiner for teaching the entry of information based upon the absence of a corresponding source address. The reference, however, is actually directed to the proper bridging between networks to ensure proper translation between the networks’ different

addressing schemes. The reference is hardly directed to the timely preparation of a key cache “for decrypting a packet subsequently re-sent by ... [an] external source,” upon an unsuccessful attempt to retrieve a required decryption key from the cache, as Claims 1, 7, and 13 recite.

It is respectfully submitted, therefore, that the Adams, Jr. et al., Abramson, et al. and Sheehy references, even when considered together, fail to disclose the unique combination of elements now more clearly recited by Applicants’ pending claims for the purposes and objectives disclosed in the subject Patent Application.

It is now believed that the subject Patent Application has been placed fully in condition for allowance, and such action is respectfully requested.

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